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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/789,210	02/27/2004	Thomas J. Plona	26.0273 US	9128
Schlumberger K.K. Intellectual Property and Legal Department			EXAMINER	
			HUGHES, SCOTT A	
	achinobe, Sagamihara-shi a-ken, 229-0006		ART UNIT	PAPER NUMBER
JAPAN			3663	
			MAIL DATE	DELIVERY MODE
			11/10/2008	PAPER

# Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

	Application No.	Applicant(s)
	10/789,210	PLONA ET AL.
Office Action Summary	Examiner	Art Unit
	SCOTT A. HUGHES	3663
The MAILING DATE of this communication ap Period for Reply	opears on the cover sheet with the	correspondence address
A SHORTENED STATUTORY PERIOD FOR REPLY WHICHEVER IS LONGER, FROM THE MAILING IT  Extensions of time may be available under the provisions of 37 CFR 1 after SIX (6) MONTHS from the mailing date of this communication.  If NO period for reply is specified above, the maximum statutory period.  Failure to reply within the set or extended period for reply will, by statu Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	DATE OF THIS COMMUNICATIO .136(a). In no event, however, may a reply be tild will apply and will expire SIX (6) MONTHS from the, cause the application to become ABANDONE	N. mely filed the mailing date of this communication. ED (35 U.S.C. § 133).
Status		
Responsive to communication(s) filed on 13 in 2a) This action is <b>FINAL</b> . 2b) The 3) Since this application is in condition for allowed closed in accordance with the practice under	is action is non-final. ance except for formal matters, pr	
Disposition of Claims		
4) ☐ Claim(s) 74 is/are pending in the application. 4a) Of the above claim(s) is/are withdra 5) ☐ Claim(s) is/are allowed. 6) ☐ Claim(s) 74 is/are rejected. 7) ☐ Claim(s) is/are objected to. 8) ☐ Claim(s) are subject to restriction and/ Application Papers 9) ☐ The specification is objected to by the Examin	or election requirement.	
10) ☐ The drawing(s) filed on 27 February 2004 is/a  Applicant may not request that any objection to the Replacement drawing sheet(s) including the corre  11) ☐ The oath or declaration is objected to by the E	re: a) $\square$ accepted or b) $\square$ objects e drawing(s) be held in abeyance. Se ction is required if the drawing(s) is ob-	e 37 CFR 1.85(a). ojected to. See 37 CFR 1.121(d).
Priority under 35 U.S.C. § 119		
<ul> <li>12) Acknowledgment is made of a claim for foreignal All b) Some * c) None of:</li> <li>1. Certified copies of the priority documents.</li> <li>2. Certified copies of the priority documents.</li> <li>3. Copies of the certified copies of the priority documents.</li> <li>* See the attached detailed Office action for a list.</li> </ul>	nts have been received. nts have been received in Applicat ority documents have been receiv au (PCT Rule 17.2(a)).	ion No ed in this National Stage
Attachment(s)  1) Notice of References Cited (PTO-892)  2) Notice of Draftsperson's Patent Drawing Review (PTO-948)  3) Information Disclosure Statement(s) (PTO/SB/08)  Paper No(s)/Mail Date	4)  Interview Summary Paper No(s)/Mail D 5)  Notice of Informal I 6)  Other:	ate

### **DETAILED ACTION**

#### Continued Examination Under 37 CFR 1.114

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed 3/13/2008 in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 1/22/2008 has been entered.

## Response to Arguments

Applicant's arguments filed 1/22/2008 have been fully considered but they are not persuasive.

Applicant argues that claim 74, which now incorporates claim 4, is patentable over Kimball in view of Bose because the combination of the references fails to provide the proper motivation to combine. Applicant argues that the prior art of record does not provide the proper necessary teachings to combine the cited references to arrive at claim 74. This argument is not persuasive, as the Bose reference provides a motivation for including the homogeneous and inhomogeneous characteristics of dispersion curve data in order to determine damaged areas of the formation near the borehole. Applicant has not argued why this teaching in Bose along with the Kimball reference does not teach all limitations of applicant's claim. Applicant has instead stated that the prior art does not have the teachings to combine the references, without explaining why this

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particular motivation is not proper. Therefore, because there is a motivation to combine the references to look for damaged areas of the formation around the borehole, applicant's arguments with respect to the combination of Kimball and Bose are not persuasive.

### Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claim 74 is rejected under 35 U.S.C. 103(a) as being unpatentable over Kimball in view of Bose.

With regard to claim 74, Kimball discloses a method displaying sonic logging data associated with an earth formation surrounding a borehole (abstract). Kimball discloses acquiring sonic data at a plurality of depths in a borehole (Figs. 1, 6) (Column 4, Line 35 to Column 5, Line 40). Kimball discloses processing the acquired sonic data to generate a slowness-versus-frequency dispersion curve for each depth (Figs. 3a,b; 4) (abstract; Column 4, Lines 35-55; Column 7, Lines 14-68; Columns 11-14; Column 15 Line 6 to Column 16, Line 10). Kimball discloses displaying a projection log of dispersion curve data for each depth versus depth (Figs. 3a,b; 4-6) (abstract; Column 5, Lines 35-40; Column 7, Lines 14-68; Column 14 Line 23 to Column 16, Line 10). Kimball does not disclose that display includes homogeneous and inhomogeneous

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characteristics of the dispersion curve data. Bose teaches a method of sonic logging.

Bose teaches that the information displayed in an SFA log display includes homogeneous and inhomogeneous characteristics of the dispersion curve data (Fig. 17) (Columns 9-10). It would have been obvious to modify Kimball to include information in the display from sonic logging that include homogeneous and inhomogeneous characteristics of the dispersion curve data in order to look for damage to the formation near the borehole.

#### Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to SCOTT A. HUGHES whose telephone number is (571)272-6983. The examiner can normally be reached on M-F 9:00am to 5:30pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jack Keith can be reached on (571) 272-6878. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Scott A. Hughes/ Examiner, Art Unit 3663